

Operation Guide 5581

CASIO®

ENGLISH

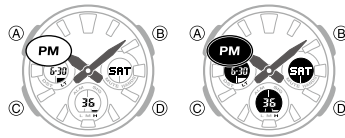
Congratulations upon your selection of this CASIO watch.

To ensure that this watch provides you with the years of service for which it is designed, carefully read and follow the instructions in this manual, especially the information under "Operating Precautions" and "User Maintenance". Keep all user documentation handy for future reference.

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About This Manual

- Depending on the model of your watch, display text appears either as dark figures on a light background, or light figures on a dark background. All examples in this manual are shown using dark figures on a light background.
- Button operations are indicated using the letters shown in the illustration.

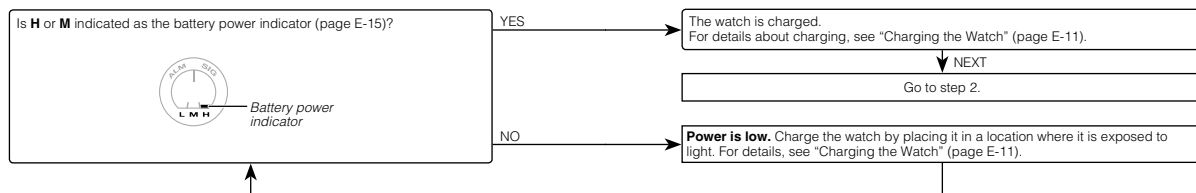


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Things to check before using the watch

1. Check the battery power level.



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2. Check the Home City and the daylight saving time (DST) setting.

Use the procedure under "To configure Home City settings" (page E-26) to configure your Home City and daylight saving time settings.

Important!

- Proper World Time Mode data depends on correct Home City, time, and date settings in the Timekeeping Mode. Make sure you configure these settings correctly.

3. Set the current time.

- To set the time**
See "Configuring Current Time and Date Settings" (page E-31).

The watch is now ready for use.

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Charging the Watch

The face of the watch is a solar panel that generates power from light. The generated power charges a built-in rechargeable battery, which powers watch operations. The watch charges whenever it is exposed to light.

Charging Guide



Whenever you are not wearing the watch, leave it in a location where it is exposed to light.
 • Best charging performance is achieved by exposing the watch to the strongest light available.



When wearing the watch, make sure that its face is not blocked from light by the sleeve of your clothing.
 • The watch may enter a sleep state (page E-19) if its face is blocked by your sleeve even only partially.

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Warning!

Leaving the watch in bright light for charging can cause it to become quite hot. Take care when handling the watch to avoid burn injury. The watch can become particularly hot when exposed to the following conditions for long periods.

- On the dashboard of a car parked in direct sunlight
- Too close to an incandescent lamp
- Under direct sunlight

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Important!

- Allowing the watch to become very hot can cause the digital displays to black out. The appearance of the LCD should become normal again when the watch returns to a lower temperature.
- Turn on the watch's Power Saving function (page E-19) and keep it in an area normally exposed to bright light when storing it for long periods. This helps to ensure that power does not run down.
- Storing the watch for long periods in an area where there is no light or wearing it in such a way that it is blocked from exposure to light can cause power to run down. Expose the watch to bright light whenever possible.

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Power Levels

You can get an idea of the watch's power level by observing the battery power indicator in the lower digital dial.



Battery power indicator

Level	Battery Power Indicator	Function Status
1 (H)		All functions enabled.
2 (M)		All functions enabled.
3 (L and LOW)		Illumination and beeper disabled. Except for Timekeeping Mode, all other modes disabled.
4 (CHG)		All functions and display indicators disabled except for timekeeping and display of CHG (charge) in the lower digital dial. Hour and minute hands stopped at 12 o'clock.
5		All functions disabled.

- The flashing **LOW** message at Level 3 (L) tells you that battery power is very low, and that exposure to bright light for charging is required as soon as possible.

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- At Level 5, all functions are disabled and settings return to their initial factory defaults. Once the battery reaches Level 2 (M) after falling to Level 5, reconfigure the current time, date, and other settings.
- Display indicators reappear as soon as the battery is charged from Level 5 to Level 2 (M).
- Leaving the watch exposed to direct sunlight or some other very strong light source can cause the battery power indicator to show a reading temporarily that is higher than the actual battery level. The correct battery level should be indicated after a few minutes.
- The current time and all other settings return to their initial factory defaults whenever battery power drops to Level 5 and when you have the battery replaced.

Power Recovery Mode

- Performing multiple illumination, beeper, and/or high-speed hand movement operation during a short period may cause all of the battery power indicators (H, M, and L) to start flashing in the lower digital dial. This indicates that the watch is in the power recovery mode. Illumination, alarm, countdown timer alarm, and hourly time signal operations will be disabled until battery power recovers.
- Battery power will recover in about 15 minutes. At this time, the battery power indicators (H, M, L) will stop flashing. This indicates that the functions listed above are enabled again.
- If all of the battery power indicators (H, M, L) are flashing and the CHG (charge) message also is flashing, it means the battery level is very low. Expose the watch to bright light as soon as possible.
- Frequent flashing of all of the battery power indicators (H, M, L) probably means that remaining battery power is low. Leave the watch in bright light to allow it to charge.

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Charging Times

Exposure Level (Brightness)	Daily Operation *1	Level Change *2			
		Level 5	Level 4	Level 3	Level 2
Outdoor sunlight (50,000 lux)	8 min.	3 hours	28 hours	8 hours	
Window sunlight (10,000 lux)	30 min.	8 hours	106 hours	29 hours	
Window sunlight on cloudy day (5,000 lux)	48 min.	13 hours	172 hours	46 hours	
Indoor fluorescent lighting (500 lux)	8 hours	182 hours	---	---	

*1 Approximate exposure each day to generate power for normal daily operation.
 *2 Approximate exposure time (in hours) required to take power up one level.

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- The above exposure times all are for reference only. Actual exposure times depend on lighting conditions.
- For details about the operating time and daily operating conditions, see the "Power Supply" (page E-69) section of the Specifications.

Power Saving

When turned on, Power Saving enters a sleep state automatically whenever the watch is left for a certain period in an area where it is dark. The table below shows how watch functions are affected by Power Saving.

- For information about enabling and disabling power saving, see "To turn Power Saving on and off" (page E-64).
- There actually are two sleep state levels: "display sleep" and "function sleep".

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Elapsed Time in Dark	Digital Dials	Operation
60 to 70 minutes (display sleep)	Blank	Digital dials are off, but all functions are enabled.
6 or 7 days (function sleep)	Blank	Hour and minute hands stop at 12 o'clock. All functions are disabled, but timekeeping is maintained.

- The watch will not enter a sleep state between 6:00 AM and 9:59 PM. If the watch is already in a sleep state when 6:00 AM arrives, however, it will remain in the sleep state.
- The watch will not enter a sleep state while it is in the Stopwatch Mode or Countdown Timer Mode.

To recover from the sleep state

Move the watch to a well-lit area or press any button.

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Mode Reference Guide

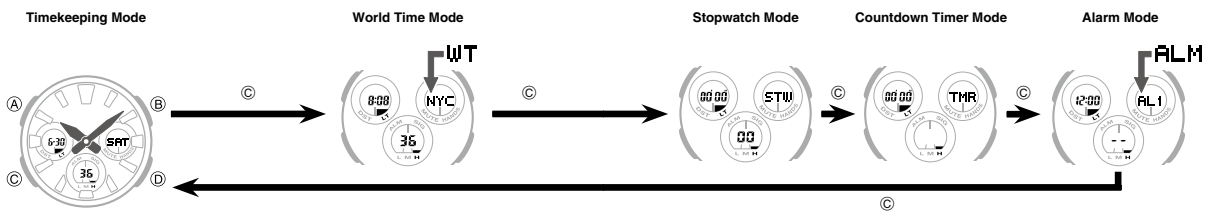
Your watch has "five modes". The mode you should select depends on what you want to do.

To do this:	Enter this mode:	See:
<ul style="list-style-type: none"> • View the current date in the Home City • Configure Home City and daylight saving time (DST) settings • Configure time and date settings • Switch between 12-hour and 24-hour timekeeping • Display an alarm countdown 	Timekeeping Mode	E-25
View the current time in one of 48 cities (31 time zones) around the globe	World Time Mode	E-36
Use the stopwatch to measure elapsed time	Stopwatch Mode	E-39
Use the countdown timer	Countdown Timer Mode	E-42
Set an alarm time	Alarm Mode	E-45

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Selecting a Mode

- The illustration below shows which buttons you need to press to navigate between modes.
- To return to the Timekeeping Mode from any other mode, hold down (C) for at least four seconds.



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General Functions (All Modes)

The functions and operations described in this section can be used in all of the modes.

Auto Return Features

- The watch returns to the Timekeeping Mode automatically if you do not perform any button operation for two or three minutes in the Alarm Mode.
- If you leave the watch in a setting mode (with flashing digits) for two or three minutes without performing any operation, the watch will exit the setting mode automatically.

Initial Screens

When you enter the World Time or Alarm Mode, the data you were viewing when you last exited the mode appears first.

Scrolling

The (B) and (D) buttons are used in the setting mode to scroll through data. In most cases, holding down these buttons during a scroll operation scrolls the data at high speed.

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Timekeeping

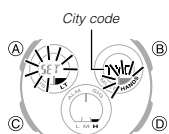
Use the Timekeeping Mode to set and view the current time and date.

- When viewing a digital dial, you can move the analog hands for an unobstructed view.
- Press (A) to toggle the left digital dial between month/day and hour/minutes.

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Configuring Home City Settings

There are two Home City settings: actually selecting the Home City, and selecting either standard time or daylight saving time (DST).



To configure Home City settings

- In the Timekeeping Mode, hold down (A) for about two seconds until **ADJ** appears in the right digital dial. When you release (A), the city code and city name will scroll across the right digital dial. This is the setting mode.
 - The watch will exit the setting mode automatically if you do not perform any operation for about two or three minutes.

- For details about city codes, see the "City Code Table" at the back of this manual.
- Whenever you enter a setting mode, the analog hands will automatically move to positions that allow easier viewing of the digital dials.

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DST indicator



- Use (E) and (B) (West) to scroll through the city codes in the right digital dial until the one you want to use as your Home City is displayed.
- Press (C) so the DST indicator is flashing in the left digital dial, which indicates the DST setting mode.
- Press (D) to toggle the DST setting between Daylight Saving Time (**ON**) and Standard Time (**OFF**) in the right digital dial.
 - Note that you cannot switch between standard time and daylight saving time (DST) while UTC is selected as your Home City.

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- After the setting is the way you want, press (A) to return to the Timekeeping Mode.
 - The **DST** indicator appears to indicate that Daylight Saving Time is turned on.
 - Exiting a setting mode will normally cause the hands to return to regular timekeeping automatically. However, if you manually move the hands (page E-60) and then enter a setting mode, they will not return to regular timekeeping automatically when you exit the setting mode. In this case, you will need to return the hands to their normal positions manually (page E-61).

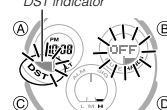
Note

- After you specify a city code, the watch will use UTC* offsets in the World Time Mode to calculate the current time for other time zones based on the current time in your Home City.
 - * *Coordinated Universal Time, the world-wide scientific standard of timekeeping. The reference point for UTC is Greenwich, England.*

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To change the Daylight Saving Time (summer time) setting

DST indicator



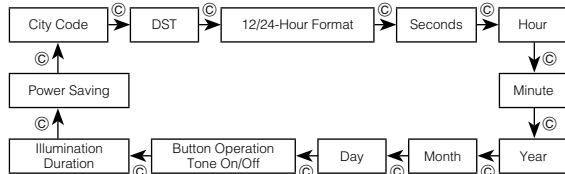
- In the Timekeeping Mode, hold down (A) for about two seconds until **ADJ** appears in the right digital dial. When you release (A), the city code and city name will scroll across the right digital dial. This is the setting mode.
 - Whenever you enter a setting mode, the analog hands will automatically move to positions that allow easier viewing of the digital dials. This is the setting mode.
- Press (C) to enter the DST setting mode.
- Press (D) to toggle the DST setting between Daylight Saving Time (**ON**) and Standard Time (**OFF**).

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4. After the setting is the way you want, press (A) to return to the Timekeeping Mode.
- The **DST** indicator appears to indicate that Daylight Saving Time is turned on.
 - Exiting a setting mode will normally cause the hands to return to regular timekeeping automatically. However, if you manually move the hands (page E-60) and then enter a setting mode, they will not return to regular timekeeping automatically when you exit the setting mode. In this case, you will need to return the hands to their normal positions manually (page E-61).

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2. Press (C) to move the flashing in the sequence shown below to select the other settings.



• The following steps explain how to configure timekeeping settings only.

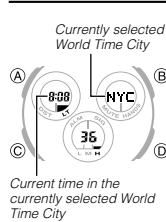
E-32

Screen	To do this:	Do this:
KEY/ MUTE	Toggle between button operation tone on (KEY) and off (MUTE)	Press (D).
LT1 / LT3	Toggle the illumination duration between three seconds (LT3) and 1.5 seconds (LT1)	

4. Press (A) to exit the setting mode.
- The watch automatically adjusts its analog setting to match the current time displayed in the left digital dial.
 - Exiting a setting mode will normally cause the hands to return to regular timekeeping automatically. However, if you manually move the hands (page E-60) and then enter a setting mode, they will not return to regular timekeeping automatically when you exit the setting mode. In this case, you will need to return the hands to their normal positions manually (page E-61).

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Using the World Time Mode



You can use the World Time Mode to view the current time in one of 31 time zones (48 cities) around the globe. The city that is currently selected in the World Time Mode is called the "World Time City".

To enter the World Time Mode

Use (C) to select the World Time Mode as shown on page E-22.

- The right digital dial will show **WT** for about one second. After that, the city code and city name will scroll once across the right digital dial, and then the three-letter corresponding city code will be displayed.

To view the time in another time zone

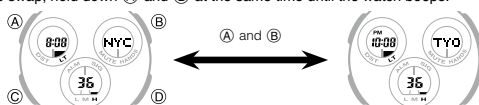
In the World Time Mode, use (D) (East) to scroll through city codes.

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- The standard time/daylight saving time (DST) setting affects only the currently selected time zone. Other time zones are not affected.

To swap your Home Time and World Time Cities

- In the World Time Mode, use (D) to select the city you want to use as your new Home City.
- To swap, hold down (A) and (B) at the same time until the watch beeps.



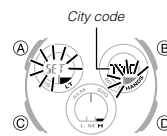
- This will make the World Time City you selected in step 1 (**NYC** (New York)) your new Home City.
- Your previous Home City (**TYO** (Tokyo)) will be your new World Time City.

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Configuring Current Time and Date Settings

You can configure current time and date settings.

To change the current time and date settings



- In the Timekeeping Mode, hold down (A) for about two seconds until **ADJ** appears in the right digital dial. When you release (A), the city code and city name will scroll across the right digital dial. This is the setting mode.

- Whenever you enter a setting mode, the analog hands will automatically move to positions that allow easier viewing of the digital dials.

- When the timekeeping setting you want to change is flashing, use (D) and/or (B) to change it as described below.

Screen	To do this:	Do this:
TYO : TOKYO	Change the city code	Use (D) (East) and (B) (West).
OFF	Toggle between Daylight Saving Time (ON) and Standard Time (OFF)	Press (D).
12H	Toggle between 12-hour (12H) and 24-hour (24H) timekeeping	
36	Reset the seconds to 00	Use (D) (+) and (B) (-).
PM 10:00	Change the hour or minute	
6:36 20 18	Change the year, month, or day	

Note

- For information about selecting a Home City and configuring the DST setting, see "Configuring Home City Settings" (page E-26).
- While 12-hour format is selected for timekeeping, a **PM** indicator will appear for times from noon to 11:59 p.m. No indicator appears for times from midnight to 11:59 a.m. With 24-hour format, time is displayed from 0:00 to 23:59, without any **PM** indicator.
- The watch's built-in full automatic calendar makes allowances for different month lengths and leap years. Once you set the date, there should be no reason to change it except after you have the watch's rechargeable battery replaced or after power drops to Level 5 (page E-15).
- The day of the week changes automatically when the date changes.
- Refer to the pages shown below for more information on Timekeeping Mode settings.
 - Button operation tone on/off: "To turn the button operation tone on and off" (page E-62)
 - Enabling and disabling power saving: "To turn Power Saving on and off" (page E-64)
 - The illumination duration: "To change the illumination duration" (page E-51)

To specify standard time or daylight saving time (DST) for a city

DST indicator



- In the World Time Mode, use (D) (East) to scroll through the city codes in the right digital dial until the one whose Standard Time/Daylight Saving Time setting you want to change is displayed.

- Hold down (A) for about two seconds until the watch beeps.

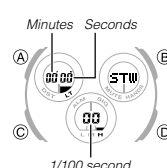
- This toggles the city code you selected in step 1 between Daylight Saving Time (DST indicator displayed in the left digital dial) and standard time (DST indicator not displayed).

- Using the World Time Mode to change the DST setting of the city code that is selected as your Home City also will change the Timekeeping Mode time DST setting.
- Note that you cannot switch between standard time/daylight saving time (DST) while **UTC** is selected as the World Time City.

E-37

Using the Stopwatch

The stopwatch measures elapsed time, split times, and two finishes.



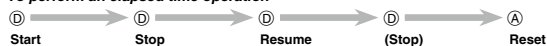
To enter the Stopwatch Mode

Use (C) to select the Stopwatch Mode (STW) as shown on page E-23.

1/100 second

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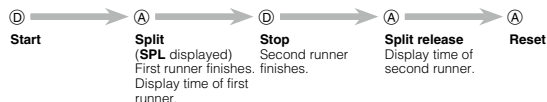
To perform an elapsed time operation



To pause at a split time



To measure two finishes



Note

- The Stopwatch Mode can indicate elapsed time up to 59 minutes, 59.99 seconds.
- An ongoing elapsed time measurement operation will continue internally even if you change to another mode. However, if you exit the Stopwatch Mode while a split time is displayed, the split time will not be displayed when you return to the Stopwatch Mode.

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Using the Countdown Timer

The countdown timer can be set within a range of one minute to 100 minutes. An alarm sounds when the countdown reaches zero.

Countdown time
(Minutes, seconds)



To enter the Countdown Timer Mode

Use (C) to select the Countdown Timer Mode (TMR) as shown on page E-23.

To specify the countdown start time

1. Enter the Countdown Timer Mode.
 - If a countdown is in progress (indicated by the seconds counting down in the left digital dial), press (D) to stop it and then press (A) to reset to the current countdown start time.
 - If a countdown is paused, press (A) to reset to the current countdown start time.

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To perform a countdown timer operation



- Before starting a countdown timer operation, check to make sure that a countdown operation is not in progress (indicated by the seconds counting down). If it is, press (D) to stop it and then (A) to reset to the countdown start time.
- An alarm sounds for 10 seconds when the end of the countdown is reached. This alarm will sound in all modes. The countdown time is reset to its starting value automatically when the alarm sounds.

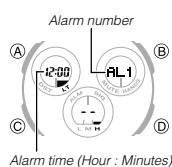
To stop the alarm

Press any button.

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2. Hold down (A) until the minute setting of the current countdown start time starts to flash. This is the setting mode.
 - Whenever you enter a setting mode, the analog hands will automatically move to positions that allow easier viewing of the digital dials.
3. Press (C) to move the flashing between the minute and second settings.
4. Use (D) (+) and (B) (-) to change the flashing item.
 - To set the starting value of the countdown time to 100 minutes, set "00'00".
5. Press (A) to exit the setting mode.
 - Exiting a setting mode will normally cause the hands to return to regular timekeeping automatically. However, if you manually move the hands (page E-60) and then enter a setting mode, they will not return to regular timekeeping automatically when you exit the setting mode. In this case, you will need to return the hands to their normal positions manually (page E-61).

Using the Alarm



You can set five independent daily alarms. When a daily alarm is turned on, an alarm tone will sound for about 10 seconds each day when the time in the Timekeeping Mode reaches the preset alarm time. This is true even if the watch is not in the Timekeeping Mode. You can also turn on an Hourly Time Signal, which will cause the watch to beep twice every hour on the hour.

To enter the Alarm Mode

Use (C) to select the Alarm Mode as shown on page E-23.

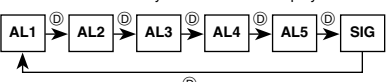
- The right digital dial will show ALM for about one second and then the indicator for the currently selected alarm (AL1 through AL5, or SIG) will appear.
- When you enter the Alarm Mode, the data you were viewing when you last exited the mode appears first.

To set an alarm time

Alarm ON/OFF indicator



1. In the Alarm Mode, use (D) to scroll through the alarm indicators (AL1 to AL5, SIG) in the right digital dial until the one whose time you want to set is displayed.



2. Hold down (A) for about two seconds until the alarm time starts to flash. This is the setting mode.
 - Whenever you enter the setting mode, the analog hands will automatically move to positions that allow easier viewing of the digital dials.
3. Press (C) to move the flashing between the hour and minute settings.

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To turn an alarm and the Hourly Time Signal on and off

Hourly Time Signal on indicator



1. In the Alarm Mode, use (D) to scroll through the alarm indicators (AL1 to AL5, SIG) in the right digital dial until the one you want is displayed.
2. When the alarm or the Hourly Time Signal you want is selected, press (A) to toggle it between on and off.
 - The alarm on indicator (when any alarm is on) and the Hourly Time Signal on indicator (when the Hourly Time Signal is on) are displayed in all modes.

To stop the alarm

Press any button.

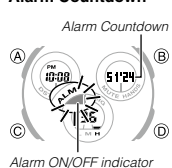
E-48

4. While a setting is flashing, use (D) (+) and (B) (-) to change it.
 - When setting the alarm time using the 12-hour format, take care to set the time correctly as a.m. (no indicator) or p.m. (PM indicator).

To test the alarm

In the Alarm Mode, hold down (D) to sound the alarm.

Alarm Countdown



When the current time reaches one hour before an alarm time setting, the alarm on/off indicator (in the lower digital dial) will flash and a countdown of the final 60 minutes will be displayed in the right digital dial while the watch is in the Timekeeping Mode.

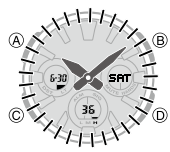
Note

- Pressing (A) while an alarm countdown is in progress will display the day of the week in the right digital dial for about two seconds. After that, the dial will return to the countdown.

- When you enter the Timekeeping Mode from another mode while an alarm countdown is in progress, the day of the week will appear in the right digital dial for two seconds. After that, the countdown will appear.
- If an alarm countdown for another alarm starts while a previous alarm countdown is already in progress, it will be displayed after the ongoing countdown reaches zero and its alarm sounds.

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■ Illumination



The face of the watch is illuminated for easy reading in the dark.

The watch's auto light switch turns on illumination automatically when you angle the watch towards your face.

- The auto light switch must be turned on (page E-54) for it to operate.

To turn on illumination manually

Press **(B)** in any mode to illuminate the face of the watch.

- You can use the procedure below to select either 1.5 seconds or three seconds as the illumination duration. When you press **(B)**, the face will remain illuminated for about 1.5 seconds or three seconds, depending on the current illumination duration setting.

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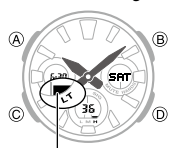
- Use **(C)** to cycle through the settings in the right digital dial until the current illumination duration (**LT1** or **LT3**) is shown.
 - See the sequence in step 2 of the procedure under "To change the current time and date settings" (page E-31) for information about how to scroll through setting mode.
- Press **(D)** to toggle the illumination duration between three seconds (**LT3** displayed) and 1.5 seconds (**LT1** displayed).
- After all of the settings are the way you want, press **(A)** to exit the setting mode.
 - Exiting a setting mode will normally cause the hands to return to regular timekeeping automatically. However, if you manually move the hands (page E-60) and then enter a setting mode, they will not return to regular timekeeping automatically when you exit the setting mode. In this case, you will need to return the hands to their normal positions manually (page E-61).

E-52

Note

- This watch features a "Full Auto Light", so the auto light switch operates only when available light is below a certain level. It does not illuminate the display under bright light.

To turn the auto light switch on and off



Auto light switch on indicator

In the Timekeeping Mode, hold down **(B)** for about three seconds to toggle the auto light switch on (indicator displayed in the right digital dial) and off (indicator not displayed).

- The auto light switch on indicator appears in all modes while the auto light switch is turned on.
- The auto light switch turns off automatically whenever battery power drops to Level 4 (page E-15).

E-54



- Illumination may not turn on if the face of the watch is more than 15 degrees above or below parallel. Make sure that the back of your hand is parallel to the ground.
- Illumination turns off after the preset illumination duration (page E-51), even if you keep the watch pointed towards your face.
- Static electricity or magnetic force can interfere with proper operation of the auto light switch. If illumination does not turn on, try moving the watch back to the starting position (parallel with the ground) and then tilt it back towards your face again. If this does not work, drop your arm all the way down so it hangs at your side, and then bring it back up again.
- You may notice a very faint clicking sound coming from the watch when it is shaken back and forth. This sound is caused by mechanical operation of the auto light switch, and does not indicate a problem with the watch.

E-56

- The watch will return to regular timekeeping automatically if you do not perform any operation for about two or three minutes. Any changes you have made to settings up to that point will be saved. If the hour and minute hands are all at 12 o'clock, which is their home position, jump to step 3.

- Use **(+)** and **(-)** to adjust the hour and minute hand positions.
 - Holding down either button will cause the hand to move at high speed. Once started, high-speed hand movement will continue even if you release the button. To stop high-speed hand movement, press any button.
 - High-speed hand movement started with the **(+)** button will stop automatically after 12 revolutions of the minute hand. If started with the **(-)** button, it will stop after one revolution of the minute hand.
- Press **(A)** to exit home position correction and return to regular timekeeping.

Note

- After performing home position adjustment, enter the Timekeeping Mode and check to make sure that the analog hands and the digital dial indicate the same time. If they do not, perform home position adjustment again.

E-58

- The above operation turns on illumination regardless of the current auto light switch setting.

Important!

- The light source of the analog hand area is an ultraviolet light emitting diode. Do not look directly at the light source lens.
- Do not attempt to remove the light source from this watch to use it for another purpose.
- Do not look directly into the light source located at 9 o'clock.

To change the illumination duration

- In the Timekeeping Mode, hold down **(A)** for about two seconds until **ADJ** appears in the right digital dial. When you release **(A)**, the city code and city name will scroll across the right digital dial. This is the setting mode.
 - Whenever you enter a setting mode, the analog hands will automatically move to positions that allow easier viewing of the digital dials.

E-51

About the Auto Light Switch

Turning on the auto light switch causes illumination to turn on, whenever you position your wrist as described below in any mode.

Moving the watch to a position that is parallel to the ground and then tilting it towards you more than 40 degrees causes illumination to turn on.



Wear the watch on the outside of your wrist

Warning!

- Always make sure you are in a safe place whenever you are reading the face of the watch using the auto light switch. Be especially careful when running or engaged in any other activity that can result in accident or injury. Also take care that sudden illumination by the auto light switch does not startle or distract others around you.
- When you are wearing the watch, make sure that its auto light switch is turned off before riding on a bicycle or operating a motorcycle or any other motor vehicle. Sudden and unintended operation of the auto light switch can create a distraction, which can result in a traffic accident and serious personal injury.

E-55

Illumination Precautions

- LED panel that provides illumination loses power after very long use.
- Illumination may be hard to see when viewed under direct sunlight.
- Illumination turns off automatically whenever an alarm sounds.
- Frequent use of illumination runs down the battery.

Auto light switch precautions

- Wearing the watch on the inside of your wrist, movement of your arm, or vibration of your arm can cause frequent activation of the auto light switch and illumination of the face. To avoid running down the battery, turn off the auto light switch whenever engaging in activities that might cause frequent illumination of the face.
- Note that wearing the watch under your sleeve while the auto light switch is turned on can cause frequent illumination of the face and can run down the battery.

E-55

Hand Home Position Adjustment

Strong magnetism or impact can cause the hands of the watch to be off.

- Home position adjustment is not necessary when the analog time and digital time are the same time in the Timekeeping Mode.

To adjust home positions manually

- In the Timekeeping Mode, hold down **(A)** and keep it depressed for about five seconds until **H.SET** appears in the right digital dial.
 - The hour and minute hands should all move to 12 o'clock, which is their home position.
 - Though **ADJ** will appear in the right digital dial about two seconds after you hold down **(A)**, do not release the button yet. Keep it depressed until **H.SET** appears. When **H.SET** appears in the right digital dial, release the **(A)** button. This will cause the hour and minute hands to move to 12 o'clock.

E-57

Moving the Hands for Easy Viewing of the Digital Dials

You can use the procedure below to move the analog hands in order to better view a digital dial.

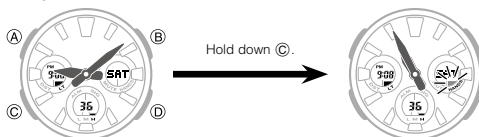
Note

- The analog hands will not move while battery power is low.

E-59

To move the hands to view a digital dial

Hold down **(C)** for about two seconds until **HAND** appears. Releasing **(C)** will cause the HANDS indicator to flash and the hands will move away from the digital dial.



E-60

To return the hands to their normal positions

Hold down **(C)** for about two seconds until **HAND** appears.

Note

- The hands will also return to their normal positions if you do not perform any operation for about one hour.
- The hands also will move away from the digital dial automatically whenever you enter a setting mode in the Timekeeping Mode, Timer Mode, or Alarm Mode.
- Hold down **(C)** for about four seconds to return the hands to their normal positions and switch to the Timekeeping Mode.

E-61

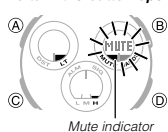
Other Settings

The button operation tone sounds any time you press one of the watch's buttons. You can turn the button operation tone on or off as desired.

- Even if you turn off the button operation tone, the alarm, Hourly Time Signal, and Countdown Timer Mode alarm all operate normally.

To turn the button operation tone on and off

1. In the Timekeeping Mode, hold down **(A)** for about two seconds until **ADJ** appears in the right digital dial. When you release **(A)**, the city code and city name will scroll across the right digital dial. This is the setting mode.
 - Whenever you enter a setting mode, the analog hands will automatically move to positions that allow easier viewing of the digital dials.



E-62

2. Use **(C)** to cycle through settings in the right digital dial until the current button operation tone (**MUTE** or **KEY[♪]**) is displayed.
 - See the sequence in step 2 of the procedure under "To change the current time and date settings" (page E-31) for information about how to scroll between settings.
3. Press **(D)** to toggle the button operation tone on (**KEY[♪]**) and off (**MUTE**).
4. After all of the settings are the way you want, press **(A)** to exit the setting mode.
 - Exiting a setting mode will normally cause the hands to return to regular timekeeping automatically. However, if you manually move the hands (page E-60) and then enter a setting mode, they will not return to regular timekeeping automatically when you exit the setting mode. In this case, you will need to return the hands to their normal positions manually (page E-61).

Note

- The mute indicator is displayed in all modes when the button operation tone is turned off.

E-63

To turn Power Saving on and off

Power saving on indicator

1. In the Timekeeping Mode, hold down **(A)** for about two seconds until **ADJ** appears in the right digital dial. When you release **(A)**, the city code and city name will scroll across the right digital dial. This is the setting mode.
 - Whenever you enter a setting mode, the analog hands will automatically move to positions that allow easier viewing of the digital dials.



2. Use **(C)** to cycle through the settings in the right digital dial until the current power saving setting (**PSON** or **PSOF**) is displayed.
 - See the sequence in step 2 of the procedure under "To change the current time and date settings" (page E-31) for information about how to scroll between settings.
3. Press **(D)** to toggle Power Saving on (**PSON**) and off (**PSOF**).

4. After all of settings are the way you want, press **(A)** to exit the setting mode.
 - Exiting a setting mode will normally cause the hands to return to regular timekeeping automatically. However, if you manually move the hands (page E-60) and then enter a setting mode, they will not return to regular timekeeping automatically when you exit the setting mode. In this case, you will need to return the hands to their normal positions manually (page E-61).

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Troubleshooting

Time Setting

■ The current time setting is off by hours.

Your Home City setting may be wrong (page E-26). Check your Home City setting and correct it, if necessary.

■ The current time setting is off by one hour.

You may need to change your Home City's standard time/daylight saving time (DST) setting. Use the procedure under "To change the current time and date settings" (page E-31) to change the standard time/daylight saving time (DST) setting.

■ The hands are off.

This could indicate that the watch has been exposed to magnetism or strong impact, which has caused problems with proper hand alignment. Adjust the watch's hand home position alignment (page E-57).

■ The analog hands are not indicating the correct time.

If the HANDS indicator is displayed on the right digital dial, it means that the analog hands have been moved for easier viewing of the digital dials. Hold down **(C)** for about four seconds to return to the Timekeeping Mode.

World Time Mode

■ The time for my World Time City is off in the World Time Mode.

This could be due to incorrect switching between standard time and daylight saving time. See "To specify standard time or daylight saving time (DST) for a city" (page E-37) for more information.

Charging

■ The watch does not resume operation after I expose it to light.

This can happen after the power level drops to Level 5 (page E-15). Continue exposing the watch to light until the battery power indicator shows **H** or **M**.

E-66

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Specifications

Accuracy at normal temperature: ±15 seconds a month

Timekeeping: Hour, minutes, seconds, p.m. (PM), year, month, day, day of the week, alarm countdown

Time format: 12-hour and 24-hour

Calendar system: Full Auto-calendar pre-programmed from the year 2000 to 2099

Other: Home City code (can be assigned one of 48 city codes); Standard Time/Daylight Saving Time (summer time)

World Time: 48 cities (31 time zones)

Other: Daylight Saving Time/Standard Time

Stopwatch:

Measuring unit: 1/100 second

Measuring capacity: 59'59.99"

Measuring modes: Elapsed time, split time, two finishes

Countdown Timer:

Countdown range: 100 minutes

Setting unit: 1 second

Start time setting range: 1 second to 100 minutes

Alarms: 5 Daily alarms; Hourly Time Signal

Double LED light: LED light for the face (Full auto LED light, Neon illuminator, selectable illumination duration, afterglow)

LED backlight for the digital display (Full auto LED light, Super illuminator, selectable illumination duration, afterglow)

Other: Battery power indicator; Power Saving; Button operation tone on/off

Power Supply: Solar panel and one rechargeable battery

Approximate battery operating time: 8 months under the following conditions:

- Display on 18 hours per day, sleep state 6 hours per day
- 1 illumination operation (1.5 seconds) per day
- 10 seconds of alarm operation per day
- 1 hand movement for easy viewing of digital information per day

Frequent use of illumination runs down the battery.

Specifications are subject to change without notice.

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Operating Precautions

Water Resistance

- The information below applies to watches with WATER RESIST or WATER RESISTANT marked on the back cover.

Marking	On watch front or on back cover	Water Resistance Under Daily Use	Enhanced Water Resistance Under Daily Use		
			5 Atmospheres	10 Atmospheres	20 Atmospheres
	No BAR mark	No	5BAR	10BAR	20BAR
	Hand washing, rain	Yes	Yes	Yes	Yes
Example of Daily Use	Water-related work, swimming	No	Yes	Yes	Yes
	Windsurfing	No	No	Yes	Yes
	Skin diving	No	No	Yes	Yes

- Do not use your watch for scuba diving or other types of diving that requires air tanks.

E-70

OPUM-E

E-71

- A trained technician will inspect your watch for proper water resistance whenever you have its battery replaced. Battery replacement requires the use of special tools. Always request battery replacement from your original retailer or from an authorized CASIO service center.
- Some water-resistant watches come with fashionable leather bands. Avoid swimming, washing, or any other activity that causes direct exposure of a leather band to water.
- The inside surface of the watch glass may fog when the watch is exposed to a sudden drop in temperature. No problem is indicated if the fogging clears up relatively quickly. Sudden and extreme temperature changes (such as coming into an air conditioned room in the summer and standing close to an air conditioner outlet, or leaving a heated room in the winter and allowing your watch to come into contact with snow) can cause it to take longer for glass fogging to clear up. If glass fogging does not clear up or if you notice moisture inside of the glass, immediately stop using your watch and take it to your original retailer or to an authorized CASIO service center.
- Your water-resistant watch has been tested in accordance with International Organization for Standardization regulations.

E-72

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Temperature

- Never leave your watch on the dashboard of a car, near a heater, or in any other location that is subject to very high temperatures. Do not leave your watch where it will be exposed to very low temperatures. Temperature extremes can cause your watch to lose or gain time, to stop, or otherwise malfunction.
- Leaving your watch in an area hotter than +60°C (140°F) for long periods can lead to problems with its LCD. The LCD may become difficult to read at temperatures lower than 0°C (32°F) and greater than +40°C (104°F).

Impact

- Your watch is designed to withstand impact incurred during normal daily use and during light activity such as playing catch, tennis, etc. Dropping your watch or otherwise subjecting it to strong impact, however, can lead to malfunction. Note that watches with shock-resistant designs (G-SHOCK, BABY-G, G-MS) can be worn while operating a chain saw or engaging in other activities that generate strong vibration, or while engaging in strenuous sports activities (motocross, etc.)

E-74

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Chemicals

- Do not allow your watch to come into contact with thinner, gasoline, solvents, oils, or fats, or with any cleaners, adhesives, paints, medicines, or cosmetics that contain such ingredients. Doing so can cause discoloration of or damage to the resin case, resin band, leather, and other parts.

Storage

- If you do not plan to use your watch for a long time, thoroughly wipe it free of all dirt, sweat, and moisture, and store it in a cool, dry place.

Resin Components

- Allowing your watch to remain in contact with other items or storing it together with other items for long periods while it is wet can cause color on resin components to transfer to the other items, or the color of the other items to transfer to the resin components of your watch. Be sure to dry off your watch thoroughly before storing it and make sure it is not in contact with other items.

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Leather Band

- Allowing your watch to remain in contact with other items or storing it together with other items for long periods while it is wet can cause the color of the leather band to transfer to the other items or the color of the other items to transfer to the leather band. Be sure to dry off your watch thoroughly with a soft cloth before storing it and make sure it is not in contact with other items.
- Leaving a leather band where it is exposed to direct sunlight (ultraviolet rays) for long periods or failure to clean dirt from a leather band for long periods can cause it to become discolored.
CAUTION: Exposing a leather band to rubbing or dirt can cause color transfer and discoloration.

Metal Components

- Failure to clean dirt from metal components can lead to formation of rust, even if components are stainless steel or plated. If metal components exposed to sweat or water, wipe thoroughly with a soft, absorbent cloth and then place the watch in a well-ventilated location to dry.

E-78

- Watches that do not have WATER RESIST or WATER RESISTANT marked on the back cover are not protected against the effects of sweat. Avoid using such a watch under conditions where it will be exposed to large amounts of sweat or moisture, or to direct splashing with water.
- Even if a watch is water resistant, note the usage precautions described below. Such types of use reduce water resistance performance and can cause fogging of the glass.
 - Do not operate the crown or buttons while your watch is submerged in water or wet.
 - Avoid wearing your watch while in the bath.
 - Do not wear your watch while in a heated swimming pool, sauna, or any other high temperature/high humidity environment.
 - Do not wear your watch while washing your hands or face, while doing housework, or while performing any other task that involves soaps or detergents.
- After submersion in seawater, use plain water to rinse all salt and dirt from your watch.
- To maintain water resistance, have the gaskets of your watch replaced periodically (about once every two or three years).

Band

- Tightening the band too tightly can cause you to sweat and make it difficult for air to pass under the band, which can lead to skin irritation. Do not fasten the band too tightly. There should be enough room between the band and your wrist so you can insert your finger.
- Deterioration, rust, and other conditions can cause the band to break or come off of your watch, which in turn can cause band pins to fly out of position or to fall out. This creates the risk of your watch falling from your wrist and becoming lost, and also creates the risk of personal injury. Always take good care of your band and keep it clean.
- Immediately stop using a band if you even notice any of the following: loss of band flexibility, band cracks, band discoloration, band looseness, band connecting pin flying or falling out, or any other abnormality. Take your watch to your original retailer or to a CASIO service center for inspection and repair (for which you will be charged) or to have the band replaced (for which you will be charged).

Magnetism

- The hands of analog and combination (analog-digital) watches are moved by a motor that uses magnetic force. When such a watch is close to a device (audio speakers, magnetic necklace, cell phone, etc.) that emits strong magnetism, the magnetism can cause timekeeping to slow down, speed up, or stop, resulting in the incorrect time being displayed.
- Very strong magnetism (from medical equipment, etc.) should be avoided because it can cause malfunction of your watch and damage to electronic components.

Electrostatic Charge

- Exposure to very strong electrostatic charge can cause your watch to display the wrong time. Very strong electrostatic charge even can damage electronic components.
- Electrostatic charge can cause the display to go blank momentarily or cause a rainbow effect on the display.

- Leaving your watch where it is exposed to direct sunlight (ultraviolet rays) for long periods or failure to clean dirt from your watch for long periods can cause it to become discolored.

- Friction caused by certain conditions (strong external force, sustained rubbing, impact, etc.) can cause discoloration of painted components.
- If there are printed figures on the band, strong rubbing of the printed area can cause discoloration.
- Leaving your watch wet for long periods can cause fluorescent color to fade. Wipe the watch dry as soon as possible after it becomes wet.
- Semi-transparent resin parts can become discolored due to sweat and dirt, and if exposed to high temperatures and humidity for long periods.
- Daily use and long-term storage of your watch can lead to deterioration, breaking, or bending of resin components. The extent of such damage depends on usage conditions and storage conditions.

- Use a soft toothbrush or similar tool to scrub the metal with a weak solution of water and a mild neutral detergent, or with soapy water. Next, rinse with water to remove all remaining detergent and then wipe dry with a soft absorbent cloth. When washing metal components, wrap the watch case with kitchen plastic wrap so it does not come into contact with the detergent or soap.

Bacteria and Odor Resistant Band

- The bacteria and odor resistant band protects against odor generated by the formation of bacteria from sweat, which ensures comfort and hygiene. In order to ensure maximum bacteria and odor resistance, keep the band clean. Use an absorbent soft cloth to thoroughly wipe the band clean of dirt, sweat, and moisture. A bacteria and odor resistant band suppresses the formation of organisms and bacteria. It does not protect against rash due to allergic reaction, etc.

Liquid Crystal Display

- Display figures may be difficult to read when viewed from an angle.

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Note that CASIO COMPUTER CO., LTD. assumes no responsibility for any damage or loss suffered by you or any third party arising through the use of your watch or its malfunction.

User Maintenance

Caring for Your Watch

- Remember that you wear your watch next to your skin, just like a piece of clothing. To ensure your watch performs at the level for which it is designed, keep it clean by frequently wiping with a soft cloth to keep your watch and band free of dirt, sweat, water and other foreign matter.
- Whenever your watch is exposed to sea water or mud, rinse it off with clean fresh water.
 - For a metal band or a resin band with metal parts, use a soft toothbrush or similar tool to scrub the band with a weak solution of water and a mild neutral detergent, or with soapy water. Next, rinse with water to remove all remaining detergent and then wipe dry with a soft absorbent cloth. When washing the band, wrap the watch case with kitchen plastic wrap so it does not come into contact with the detergent or soap.
 - For a resin band, wash with water and then wipe dry with a soft cloth. Note that sometimes a smudge like pattern may appear on the surface of a resin band. This will not have any effect on your skin or clothing. Wipe with a cloth to remove the smudge pattern.

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- Clean water and sweat from a leather band by wiping with a soft cloth.
- Not operating a watch crown, buttons, or rotary bezel could lead to later problems with their operation. Periodically rotate the crown and rotary bezel, and press buttons to maintain proper operation.

Dangers of Poor Watch Care

Rust

- Though the metal steel used for your watch is highly rust-resistant, rust can form if your watch is not cleaned after it becomes dirty.
 - Dirt on your watch can make it impossible for oxygen to come into contact with the metal, which can lead to breakdown of the oxidization layer on the metal surface and the formation of rust.
- Rust can cause sharp areas on metal components and can cause band pins to fly out of position or to fall out. If you ever notice any abnormality immediately stop using your watch and take it to your original retailer or to an authorized CASIO service center.

- Even if the surface of the metal appears clean, sweat and rust in crevasses can soil the sleeves of clothing, cause skin irritation, and even interfere with watch performance.

Premature Wear

- Leaving sweat or water on a resin band or bezel, or storing your watch an area subject to high moisture can lead to premature wear, cuts, and breaks.

Skin Irritation

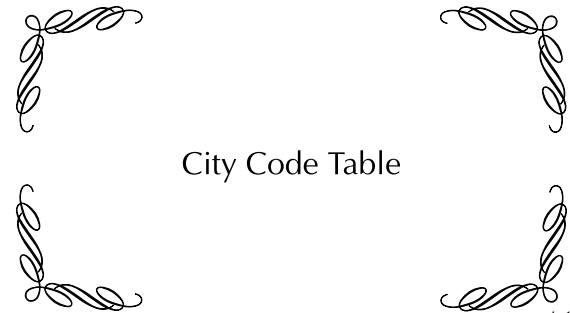
- Individuals with sensitive skin or in poor physical condition may experience skin irritation when wearing a watch. Such individuals should keep their leather band or resin band particularly clean. Should you ever experience a rash or other skin irritation, immediately remove your watch and contact a skin care professional.

E-82

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Battery

- The special rechargeable battery used by your watch is not intended to be removed or replaced by you. Use of a rechargeable battery other than the special one specified for your watch can damage your watch.
- The rechargeable (secondary) battery is charged when the solar panel is exposed to light, so it does not require regular replacement as the primary battery requires. Note, however, that long use or operating conditions can cause the capacity or charging efficiency of the rechargeable battery to deteriorate. If you feel that the amount of operation provided by charging is too short, contact your original retailer or CASIO service center.



City Code Table

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L-1

City Code Table

City Code	City	UTC Offset/ GMT Differential
PPG	Pago Pago	-11
HNL	Honolulu	-10
ANC	Anchorage	-9
YVR	Vancouver	-8
LAX	Los Angeles	-8
YEA	Edmonton	-7
DEN	Denver	-7
MEX	Mexico City	-6
CHI	Chicago	-6
NYC	New York	-5
SCL	Santiago	-4
YHZ	Halifax	-4
YYT	St. Johns	-3.5
RIO	Rio De Janeiro	-3
FEN	Fernando De Noronha	-2

L-2

City Code	City	UTC Offset/ GMT Differential
RAI	Praia	-1
UTC		
LIS	Lisbon	0
LON	London	
MAD	Madrid	
PAR	Paris	
ROM	Rome	+1
BER	Berlin	
STO	Stockholm	
ATH	Athens	
CAI	Cairo	+2
JRS	Jerusalem	
MOW	Moscow	+3
JED	Jeddah	
THR	Tehran	+3.5

City Code	City	UTC Offset/ GMT Differential
DXB	Dubai	+4
KBL	Kabul	+4.5
KHI	Karachi	+5
DEL	Delhi	+5.5
KTM	Kathmandu	+5.75
DAC	Dhaka	+6
RGN	Yangon	+6.5
BKK	Bangkok	+7
SIN	Singapore	
HKG	Hong Kong	+8
BJS	Beijing	
TPE	Taipei	
SEL	Seoul	+9
TYO	Tokyo	+9
ADL	Adelaide	+9.5

City Code	City	UTC Offset/ GMT Differential
GUM	Guam	+10
SYD	Sydney	+11
NOU	Noumea	+11
WLG	Wellington	+12

- This table shows the city codes of this watch. (As of July 2017)
- The rules governing global times (UTC offset and GMT differential) and summer time are determined by each individual country.

L-3

CASIO COMPUTER CO., LTD.
6-2, Hon-machi 1-chome
Shibuya-ku, Tokyo 151-8543, Japan